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T-936 P01/21 U-130

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FROM: Winston Hsu, PATENT AGENT, REG. NO. : 41,526

SERIAL NO.: 10/604,855

ATTORNEY DOCKET NO.: ADTP0091USA

SUBJECT: INFORMATION DISCLOSURE STATEMENT

TOTAL PAGES: 21 PAGES (INCLUDING COVER PAGE)

Winston Hsu 2004/05/11

ADTP0091USA0_D1_1

PTO/SB/97 (08-00)

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APPLICATION NUMBER: 10/604,855

PAPERS INCLUDED:

(1) Transmittal Form	1 PAGE
(2) Fee Transmittal	1 PAGE
(3) Information Disclosure Statement	17 PAGES

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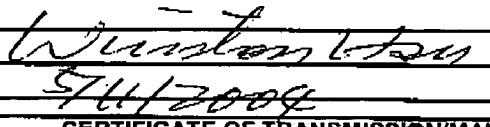
Total Number of Pages In This Submission 19

Application Number	10/804,855
Filing Date	08/21/2003
First Named Inventor	Chien-Sheng Yang
Art Unit	2856
Examiner Name	
Attorney Docket Number	ADTP0091ISA

ENCLOSURES (Check all that apply)

<input checked="" type="checkbox"/> Fee Transmittal Form	<input type="checkbox"/> Drawing(s)	<input type="checkbox"/> After Allowance communication to Technology Center (TC)
<input type="checkbox"/> Fee Attached	<input type="checkbox"/> Licensing-related Papers	<input type="checkbox"/> Appeal Communication to Board of Appeals and Interferences
<input type="checkbox"/> Amendment/Reply	<input type="checkbox"/> Petition	<input type="checkbox"/> Appeal Communication to TC (Appeal Notice, Brief, Reply Brief)
<input type="checkbox"/> After Final	<input type="checkbox"/> Petition to Convert to a Provisional Application	<input type="checkbox"/> Proprietary Information
<input type="checkbox"/> Affidavits/declaration(s)	<input type="checkbox"/> Power of Attorney, Revocation	<input type="checkbox"/> Status Letter
<input type="checkbox"/> Extension of Time Request	<input type="checkbox"/> Change of Correspondence Address	<input type="checkbox"/> Other Enclosure(s) (please identify below):
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<input checked="" type="checkbox"/> Information Disclosure Statement	<input type="checkbox"/> Request for Refund	
<input type="checkbox"/> Certified Copy of Priority Document(s)	<input type="checkbox"/> CD, Number of CD(s) _____	
<input type="checkbox"/> Response to Missing Parts/Incomplete Application		
<input type="checkbox"/> Response to Missing Parts under 37 CFR 1.52 or 1.53		
Remarks		

SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm or Individual name	Winston Hsu, Reg. No.: 41,526
Signature	
Date	5/11/2004

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This collection of information is required by 37 CFR 1.5. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

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PTO/SB/17 (10-03)

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FEE TRANSMITTAL for FY 2004

Effective 10/01/2003. Patent fees are subject to annual revision.

 Applicant claims small entity status. See 37 CFR 1.27

TOTAL AMOUNT OF PAYMENT (\$ 0.00)

Complete if Known

Application Number	10/604,855
Filing Date	08/21/2003
First Named Inventor	Chien-Sheng Yang
Examiner Name	
Art Unit	2856
Attorney Docket No.	ADTP0091)SA

METHOD OF PAYMENT (check all that apply)

Check Credit card Money Order Other None
 Deposit Account:

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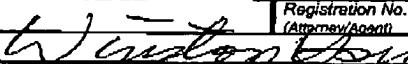
FEE CALCULATION (continued)

3. ADDITIONAL FEES

Large Entity	Small Entity	Fee Code (\$)	Fee Code (\$)	Fee Description	Fee Paid
1001 770	2001 385	Utility filing fee			
1002 340	2002 170	Design filing fee			
1003 530	2003 265	Plant filing fee			
1004 770	2004 385	Reissue filing fee			
1005 160	2005 80	Provisional filing fee			
SUBTOTAL (1) (\$ 0.00)					
2. EXTRA CLAIM FEES FOR UTILITY AND REISSUE					
Total Claims	Extra Claims below	Fee from		Fee Paid	
<input type="checkbox"/>	-20** =	<input type="checkbox"/> X <input type="checkbox"/>	=		
Independent Claims	- 3** =	<input type="checkbox"/> X <input type="checkbox"/>	=		
Multiple Dependent		<input type="checkbox"/> X <input type="checkbox"/>	=		
Large Entity		Small Entity		Fee Description	
Fee Code (\$)	Fee Code (\$)	Fee Description			
1202 18	2202 9	Claims in excess of 20			
1201 86	2201 43	Independent claims in excess of 3			
1203 290	2203 145	Multiple dependent claim, if not paid			
1204 86	2204 43	** Reissue independent claims over original patent			
1205 18	2205 9	** Reissue claims in excess of 20 and over original patent			
SUBTOTAL (2) (\$ 0.00)					
*or number previously paid, if greater; For Reissues, see above					
Other fee (specify) _____					
*Reduced by Basic Filing Fee Paid					
SUBTOTAL (3) (\$ 0.00)					

SUBMITTED BY

(Complete if applicable)

Name (Print/Type)	Winston Hsu	Registration No. (Attorney/Agent)	41,526	Telephone	886289237350
Signature				Date	5/11/2004

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PTO/SB/08A (10-01)

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<p>Substitute for Form 1449A/PTO</p> <p>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</p> <p>(use as many sheets as necessary)</p>				<p>Complete if Known</p>	
Sheet	1	of	1	Application Number	10/604,855
				Filing Date	08/21/2003
				First Named Inventor	Chien-Sheng Yang
				Art Unit	2856
				Examiner Name	
				Attorney Docket Number	ADTP0091ISA

U.S. PATENT DOCUMENTS

FOREIGN PATENT DOCUMENTS

Examiner Signature		Date Considered	
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***EXAMINER:** Initial if reference considered, whether or not citation is in conformance with MPEP 809. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

¹ Applicant's unique citation designation number (optional). ² See Kinds of USPTO Patent Documents at www.uspto.gov or MPEP 801.04. ³ Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). ⁴ For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. ⁵ Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. ⁶ Applicant is to place a check mark here if English language Translation is attached.

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Cite No. 1

PATENTIN THE UNITED STATES PATENT AND TRADEMARK OFFICE **RECEIVED**
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Applicant: Chien-Sheng Yang
5 Filing Date: 08/21/2003 Art Unit: 2856
Application No.: 10/604,855 Docket No.:
ADTP0091USA

MAY 11 2004
OFFICIAL

10 Title: CAPACITIVE ACCELERATION SENSOR

To: Commissioner for Patents
P.O. Box 1450
Alexandria VA 22313-1450

15 Subject: Information Disclosure Statement under 37
C.F.R. §1.56.

Dear Sir:

20 This is an Information Disclosure Statement in accordance with the duty to disclose information material to patentability under 37 C.F.R. §1.56. Applicant wishes to make of record the document listed
25 on the accompanying form PTO/SB/08. It is respectfully requested that the examiner initials the cited reference on the form and that it be made of record in the application and that a copy of the initialed form be sent to the applicant with the next
30 communication from the examiner.

Since the IDS is filed before the mailing date of

a first Office action on the merits, consideration of the information disclosure statement is hereby requested according to 37 C.F.R. §1.97(b). The prior art patent contained in the information disclosure statement was cited in communications from the Taiwan Intellectual Property Office on Apr. 21, 2004. Applicant sincerely hopes that the examiner can consider the item contained in the information disclosure statement.

10

According to the requirement set forth in 37 C.F.R. §1.98 and M.P.E.P. 609 (8th edition, Aug.-2001), the applicant is submitting copies of the cited reference (Taiwan Patent publication No. 230,237, published Sep 11, 1994) and a concise explanation of the relevance in this application hereinafter.

TW Patent 230,237 discloses an acceleration sensor having a mass part fashioned at springs as micromechanical components in the silicon layer on a SOI substrate, and piezo-resistors for detecting an excursion of the mass part (Abstract). This reference has never disclosed structure of the present application, such as the non-single-crystal-silicon-based substrate, the polysilicon beam structure, the polysilicon supporter, the stationary electrode, the plate capacitor, or the thin film transistor. The reference patent is obviously different from the present application.

30

The disadvantages of using polysilicon material as an acceleration sensor is mentioned in the reference.

But the mentioned disadvantages are directed against the silicon micromechanical device disclosed in IEEE spectrum, Jul. 1990, page 29-35, and cannot be extended to all acceleration sensors using the polysilicon 5 material.

Independent claims 1 and 11 of the present application are repeated below for reference:

- 10 1. A capacitive acceleration sensor comprising:
 - a non-single-crystal-silicon-based substrate;
 - a polysilicon beam structure having a movable section, the movable section comprising a movable electrode;
- 15 a polysilicon supporter positioned on the non-single-crystal-silicon-based substrate for fixing the beam structure and forming a distance between the beam structure and the non-single-crystal-silicon-based substrate;
- 20 a stationary electrode positioned on the non-single-crystal-silicon-based substrate and opposite to the movable section of the beam structure, the stationary electrode and the movable electrode constituting a plate capacitor; and
- 25 a thin film transistor (TFT) control circuit positioned on the non-single-crystal-silicon-based substrate and electrically connected to the plate capacitor.
- 30

11. A capacitive acceleration sensor comprising:
an insulating substrate;
a cantilever beam structure positioned on the
insulating substrate having a movable
5 section, the movable section comprising a
movable electrode;
a stationary electrode positioned on the
insulating substrate and opposite to the
movable section of the cantilever beam
structure, the stationary electrode and the
10 movable electrode constituting a plate
capacitor; and
a control circuit positioned on the insulating
substrate and electrically connected to the
15 plate capacitor.

Since claims of the present application are substantially different from the prior art patent TW 230,237, a quick allowance of the present application is sincerely requested.

20

Respectfully Submitted,

25

Winston Hsu

Date: 5/11/2004

Winston Hsu, Patent Agent No. 41,526

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(Please contact me by e-mail if you need a telephone communication and I will return your call promptly.)